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10 August 2016

Mr. John Nordine U.S. EPA Region 5 RCRA Enforcement and Compliance Assurance Branch (LU-9J) 77 West Jackson Boulevard Chicago, Illinois 60604

Re: Central Wire, Union, Illinois RCRA CMI Monthly Progress Report for July 2016

Dear Mr. Nordine:

Enclosed please find the RCRA CMI Monthly Progress Report for the Central Wire facility located in Union, Illinois for July 2016.

This report includes eDMR for the groundwater pump and treat facility and the laboratory analytical reports, which includes the effluent data used in the eDMR for July 2016 and the resampling of monitoring well DGW-2D.

If you have any comments or questions regarding the progress of this project, please contact me at (262) 237-1130.

Sincerely,

Autumnwood ESH Consultants, LLC

John W. Thorsen, P.E.

John W. Shows

JWT:jt

encl

cc: Joyce Munie IEPA

Robert Kay USGS

Gerald W. Ruopp Central Wire Robert Johnson Central Wire

MONTHLY PROGRESS REPORT Central Wire Union, Illinois Site July 2016

1. <u>Progress Made This Reporting Period</u> – This reporting period Central Wire continued the operation and maintenance of the groundwater extraction and treatment system. Central Wire treated an average of 609,000 gallons per day with a maximum daily flow of 613,000 gallons per day and met effluent limitations for pH, 1,1,1-Trichloroethane (TCA), Trichloroethene (TCE) and Tetrachloroethene (PCE). The electronic Discharge Monitoring Report (eDMR) for July 2016 is attached to this report.

The laboratory analytical report for the pump and treat effluent noted that the groundwater pump & treat effluent samples were collected on July 12 and arrived at the lab on July 13, 2016 at -0.8° C.

The summary of the irrigation pumping hours are summarized in Table 1, below.

Table 1
Summary of 2016 Irrigation Pumping Hours per Week at Ex. 6 Personal Privacy (PP)
(July 1 through August 2, 2016)

Date of Hour Meter Reading	Ex. 6 Personal Privacy (PP)		Ex. 6 Personal Privacy (PP)	
	Hour Meter Reading	Hours Pumped	Hour Meter Reading	Hours Pumped
7/1/2016	5990	0	3813	0
7/5/2016	6028	38	3827	14
7/11/2016	6089	61	3848	21
7/18/2016	6178	89	3881	33
7/25/2016	6238	60	3900	19
8/2/2016	6304	66	3931	31
Totals		314		118

On August 2 Central Wire personnel downloaded the data logger in the field for July data to a laptop computer and reinserted the same data logger into monitoring well DGW-2I.

The groundwater level monitoring data from downgradient monitoring well DGW-2I for July 2016, the July 2016 precipitation and irrigation well pumping over the month have been graphed / plotted and are attached to this report as Table 2.

The depth to water measured from the top of the well casing was 6.37 feet in DGW-2I on July 1, 2016; therefore, there nominally was 23.97 feet of water above the data logger. The first data logger reading on July 1 at 12:03 was 23.891 feet. The difference was 0.079 feet a difference of 0.33%.

On August 2, the last data logger reading at 14:48 calculated the water level at 23.57 feet of water above the data logger. The manual depth to water measurement from the top of the casing of 6.68 feet, therefore there should be 23.66 feet of water above the data logger

(30.34 - 6.68). There was a difference of 0.09 feet or 0.38%. The differences between the starting and ending manual and data logger measurements were relatively the same, 0.33% and 0.38% differences, see Table 3, attached. The field data associated with this sample is found in Table 4, attached.

The groundwater elevation in July 2016 reached its highest level on July 26 at 814.905 feet above mean sea level and its low on July 13 at 814.04 feet above mean sea level for a variance of 0.865 feet over the month.

2. Summary of Validated Data and Results

Pump & Treat System NPDES Sampling

The monthly effluent sampling took place on July 21, 2016. The permit limitations and analytical results are shown in Table 5, below.

Table 5
Central Wire Union Illinois Pump & Treat Discharge Analytical Results

Parameter	Effluent Limitation (Daily Maximum), µg/L	July2016 Analytical Results, μg/L
1,1,1-Trichloroethane	20	< 0.38
Tetrachloroethene	20	< 0.37
Trichloroethene	20	0.28 J

J = Result is less than the Reporting Limit but >/= to the Method Detection Limit and the concentration is an approximate value

The July NPDES analytical report is attached to this Monthly Progress Report.

This report also had environmental analytical results for the North Pond and South Pond. These ponds are Illinois EPA-regulated seepage ponds for Central Wire's rinse waters from the annealing process, non-contact cooling water, boiler blowdown and storm water. Data from the quarterly analysis of samples collected at extraction wells 1 and 2 are also included in this lab report.

Semiannual RCRA Monitoring Well and Residential Well Sampling Event

The spring semiannual RCRA CMI groundwater and residential well sampling event was conducted on June 7 & 8, 2016. DGW-2 is a three well nest (shallow, intermediate and deep) that has been sampled since 2012. There have been no detections in these three wells; however, 1,1,1-TCA (at 1.2 μ g/L) and TCE (at 0.5 μ g/L) were detected in DGW-2D in June 2016, the first detections. 1,1,1-TCA was found at 0.006 of the MCL and TCE was found at 0.1 of the MCL. Nonetheless, since there had been no detections in the previous five years of sampling, Central Wire was concerned and resampled that well on July 21.

The sample was received at the lab on July 22, 2016 at 3.1° C. There were no detections.

2016 RCRA CMI Field Investigation

Since a chemical of concern was found in the new and most downgradient Geoprobe point at GP-27D (1-1 Dichloroethene at 1.2 μ g/L and the EPA Maximum Contaminant Limit is 7 μ g/L), EPA has requested that Central Wire place an additional three Geoprobe points, one about 100-150 feet due north of GP-27, a second a similar distance oriented about 60 degrees west of north from GP-27, and a third location about halfway between GP-27 and GP-24.

Central Wire Plans on doing this on August 31st and September 1st, 2016.

3. <u>Upcoming Events/Activities Planned</u> – Central Wire will continue to operate the existing remediation systems. Effluent samples will be collected, analyzed and reported as required in our NPDES permit.

Central Wire has received a second bid to rehabilitate Extraction Well No. 2 and is scheduling this work with the land owner. Central Wire expects to have this work completed by mid-October.

- 4. Anticipated Problem Areas and Recommended Solutions None.
- 5. Key Personnel Changes None.
- **Target and Actual Completion Dates** This project has not deviated from the project schedule.